Chapter 3

RESEARCH METHODOLOGY

In the earlier chapters, the theoretical environment of the study was defined and discussed. In this chapter the research methodology has been defined which was used in the study. This chapter deals with (i) Statement of the problem, (ii) Purpose of the study, (iii) Objectives of the study, (iv) Hypothesis of the study, (v) Significance of the study, (vi) Delimitations of the study, (vii) The population, (viii) Sample, (ix) Questionnaire, (x) Collection of data, (xi) Statistical techniques to analyse the data, (xii) Profile of the Sampled Respondent.

3.1 STATEMENT OF THE PROBLEM

The problem of the study is as under:

“Consumers’ Susceptibility to Reference Group Influence on Selected Products – A Study in Chhattisgarh”

3.2 PURPOSE OF THE STUDY

The study aims to find the consumers’ susceptibility to informational, utilitarian and value expressive influence by reference group on selected products for purchase in the state of Chhattisgarh. And to investigate the reference group influence on consumers before and at the time of buying selected products. It will also explore the reference group influence on selected products among different demographic variables.
3.3 OBJECTIVES OF THE STUDY

In fulfillment of the above purpose, following explicit objectives were designed for the study:

1. To find out reference group influence on consumers before buying the selected products.

2. To find out reference group influence on consumers at the time of buying selected products.

3. To identify the consumers susceptibility to the informational influence by reference group on selected products across selected demographic variables.

4. To identify the consumers susceptibility to the utilitarian influence by reference group on selected products across selected demographic variables.

5. To identify the consumers susceptibility to the value expressive influence by reference group on selected products across selected demographic variables.

3.4 HYPOTHESES

On the basis of above objectives following null hypotheses were formulated:

H\textsubscript{01}: There is no significant difference in reference group influence over respondents sex wise while recognizing need to buy the selected products.

H\textsubscript{02}: There is no significant difference in reference group as a Source of information before buying selected products sex wise over respondents.

H\textsubscript{03}: There is no significant difference in reference group influence over respondents while evaluation of alternatives before buying selected products sex wise.
H₀₄: There is no significant difference in reference group influence over respondents at the time of buying selected products sex wise.

H₀₅: There is no significant difference among the respondents across the cities for searching information about various brands and models of TV/LCD from an association of professionals or independent group of experts.

H₀₆: There is no significant difference among the respondents across the cities who seek information about TV/LCD from those who work in the concerned industry.

H₀₇: There is no significant difference among the respondents across the cities that collect information about TV / LCD from friends, neighbors, relatives, or work associates.

H₀₈: There is no significant difference among the respondents across the cities to change their mind set in case of exposure to TV/LCD or retailers.

H₀₉: There is no significant difference among the respondents across the cities in choosing TV / LCD on the basis of word of mouth or evaluation reports

H₀₁₀: There is no significant difference among the respondents across the cities for searching information about various brands and models of DTH from an association of professionals or independent group of experts.

H₀₁₁: There is no significant difference among the respondents across the cities who seek information about DTH from those who work in the concerned industry.

H₀₁₂: There is no significant difference among the respondents across the cities that collect information about DTH from friends, neighbors, relatives, or work associates.

H₀₁₃: There is no significant difference among the respondents across the cities to change their mind set in case of exposure to DTH or retailers.
H014: There is no significant difference among the respondents across the cities in choosing DTH on the basis of word of mouth or evaluation reports.

H015: There is no significant difference among the respondents across the cities for searching information about various brands and models of Bike from an association of professionals or independent group of experts.

H016: There is no significant difference among the respondents across the cities who seek information about Bike from those who work in the concerned industry.

H017: There is no significant difference among the respondents across the cities that collect information about Bike from friends, neighbors, relatives, or work associates.

H018: There is no significant difference among the respondents across the cities to change their mind set in case of exposure to Bike or retailers.

H019: There is no significant difference among the respondents across the cities in choosing Bike on the basis of word of mouth or evaluation reports.

H020: There is no significant difference among the respondents across the cities for searching information about various brands and models of Smartphone from an association of professionals or independent group of experts.

H021: There is no significant difference among the respondents across the cities who seek information about Smartphone from those who work in the concerned industry.

H022: There is no significant difference among the respondents across the cities that collect information about Smartphone from friends, neighbors, relatives, or work associates.

H023: There is no significant difference among the respondents across the cities to change their mind set in case of exposure to Smartphone or retailers.
H_{024}: There is no significant difference among the respondents across the cities in choosing Smartphone on the basis of word of mouth or evaluation reports.

H_{025}: There is no significant difference among the respondents across the cities for searching information about various brands and models of refrigerator from an association of professionals or independent group of experts.

H_{026}: There is no significant difference among the respondents across the cities who seek information about refrigerator from those who work in the concerned industry.

H_{027}: There is no significant difference among the respondents across the cities that collect information about refrigerator from friends, neighbors, relatives, or work associates.

H_{028}: There is no significant difference among the respondents across the cities to change their mind set in case of exposure to refrigerator or retailers.

H_{029}: There is no significant difference among the respondents across the cities in choosing refrigerator on the basis of word of mouth or evaluation reports.

H_{030}: There is no significant difference among respondents across cities with respect to influence of friends evaluation and preferences about TV/LCD.

H_{031}: There is no significant difference among respondents across cities with respect to influence of other person’s recommendations for final decision to buy TV/LCD across cities.

H_{032}: There is no significant difference among respondents across cities with respect to influence of family members preferences and choice about TV/LCD across cities.

H_{033}: There is no significant difference among respondents across cities with respect to influence of classmates or fellow work associates preferences while buying TV/LCD.
$H_{034}$: There is no significant difference among respondents across cities with respect to influence of friends evaluation and preferences about DTH.

$H_{035}$: There is no significant difference among respondents across cities with respect to influence of other person’s recommendations for final decision to buy DTH across cities.

$H_{036}$: There is no significant difference among respondents across cities with respect to influence of family members preferences and choice about DTH across cities.

$H_{037}$: There is no significant difference among respondents across cities with respect to influence of classmates or fellow work associates preferences while buying DTH.

$H_{038}$: There is no significant difference among respondents across cities with respect to influence of friends evaluation and preferences about bike.

$H_{039}$: There is no significant difference among respondents across cities with respect to influence of other person’s recommendations for final decision to buy bike across cities.

$H_{040}$: There is no significant difference among respondents across cities with respect to influence of family members preferences and choice about bike across cities.

$H_{041}$: There is no significant difference among respondents across cities with respect to influence of classmates or fellow work associates preferences while buying bike.

$H_{042}$: There is no significant difference among respondents across cities with respect to influence of friends evaluation and preferences about Smartphone.
H₀₄₃: There is no significant difference among respondents across cities with respect to influence of other person’s recommendations for final decision to buy Smartphone across cities.

H₀₄₄: There is no significant difference among respondents across cities with respect to influence of family members preferences and choice about Smartphone across cities.

H₀₄₅: There is no significant difference among respondents across cities with respect to influence of classmates or fellow work associates preferences while buying Smartphone.

H₀₄₆: There is no significant difference among respondents across cities with respect to influence of friends evaluation and preferences about refrigerator.

H₀₄₇: There is no significant difference among respondents across cities with respect to influence of other person’s recommendations for final decision to buy refrigerator across cities.

H₀₄₈: There is no significant difference among respondents across cities with respect to influence of family members preferences and choice about refrigerator across cities.

H₀₄₉: There is no significant difference among respondents across cities with respect to influence of classmates or fellow work associates preferences while buying refrigerator.

H₀₅₀: Respondents across cities do not differ in choosing a particular brands or models of TV/LCD to enhance their image in front of others.

H₀₅₁: Respondents across cities who buy or use the TV/LCD of a particular brand or model do not differ.
H052: Respondents across cities do not differ in using TV/LCD as shown in advertisements.

H053: Respondents across cities do not differ in thinking that people who purchase the TV/LCD of a particular brand or model are sometimes admired or respected by others.

H054: Respondents across cities do not differ in thinking that using TV/LCD of a particular brand or model helps them to show others who they are or whom they would like to be.

H055: Respondents across cities do not differ in choosing a particular brands or models of DTH to enhance their image in front of others.

H056: Respondents across cities who buy or use the DTH of a particular brand or model do not differ.

H057: Respondents across cities do not differ in using DTH as shown in advertisements.

H058: Respondents across cities do not differ in thinking that people who purchase the DTH of a particular brand or model are sometimes admired or respected by others.

H059: Respondents across cities do not differ in thinking that using DTH of a particular brand or model helps them to show others who they are or whom they would like to be.

H060: Respondents across cities do not differ in choosing a particular brands or models of bike to enhance their image in front of others.

H061: Respondents across cities who buy or use the bike of a particular brand or model do not differ.

H062: Respondents across cities do not differ in using bike as shown in advertisements.
H063: Respondents across cities do not differ in thinking that people who purchase the bike of a particular brand or model are sometimes admired or respected by others.

H064: Respondents across cities do not differ in thinking that using bike of a particular brand or model helps them to show others who they are or whom they would like to be.

H065: Respondents across cities do not differ in choosing a particular brands or models of Smartphone to enhance their image in front of others.

H066: Respondents across cities who buy or use the Smartphone of a particular brand or model do not differ.

H067: Respondents across cities do not differ in using Smartphone as shown in advertisements.

H068: Respondents across cities do not differ in thinking that people who purchase the Smartphone of a particular brand or model are sometimes admired or respected by others.

H069: Respondents across cities do not differ in thinking that using Smartphone of a particular brand or model helps them to show others who they are or whom they would like to be.

H070: Respondents across cities do not differ in choosing a particular brands or models of refrigerator to enhance their image in front of others.

H071: Respondents across cities who buy or use the refrigerator of a particular brand or model do not differ.

H072: Respondents across cities do not differ in using refrigerator as shown in advertisements.
$H_{073}$: Respondents across cities do not differ in thinking that people who purchase the refrigerator of a particular brand or model are sometimes admired or respected by others.

$H_{074}$: Respondents across cities do not differ in thinking that using refrigerator of a particular brand or model helps them to show others who they are or whom they would like to be.

$H_{075}$: There is no significant difference in Informational Influence of Reference Group over respondents for buying selected products.

$H_{076}$: There is no significant difference in Utilitarian Influence of Reference Group over respondents for buying selected products.

$H_{077}$: There is no significant difference in Value Expressive Influence of Reference Group over respondents for buying selected products.

$H_{078}$: There is no significant difference in Reference Group Influence over respondents for buying TV/ LCD.

$H_{079}$: There is no significant difference in Reference Group Influence over respondents for buying DTH

$H_{080}$: There is no significant difference in Reference Group Influence over respondents for buying Bike

$H_{081}$: There is no significant difference in Reference Group Influence over respondents for buying Smartphone

$H_{082}$: There is no significant difference in Reference Group Influence over respondents for buying Refrigerator
3.5 SIGNIFICANCE OF THE STUDY

In the view of theoretical and practical concerns, the study is having utmost significance.

3.5.1 Theoretical Concern

1. Theoretically, the current study intends to find out the consumers’ susceptibility to reference group influence on selected product in Chhattisgarh. It visualized the consumers’ behavior in term of reference group influence in taking decisions on the selected products.

2. The findings of the study may provide a view for understanding the influencing factors across the different products on the basis of demographic factors in the state of Chhattisgarh.

3. The findings of the study may reveal multiplicity of factors responsible for manipulating consumer’s thoughts which includes demonstrator of the product, product specialist, financial source, time of purchase, circumstances on the time of purchase etc., all these influences consumers and their behavior.

4. The study may examine the relevance of reference group influence on the selected product in Chhattisgarh.

5. The study may investigate the major source of information for the consumer which leads to purchase decisions.

6. The findings of the study may clearly reveal the influence of reference group before buying and at the time of buying selected products.

7. The finding of the study may provide a clear view that which type of influence of reference group is dominant and consumers’ susceptibility towards those informational influences.
8. The finding of the study will explore the factors influencing the consumers before buying the selected products and at the time of buyings selected products.

3.5.2 Practical Concern

The practical concern of the study is as under:

1. In Practice the study really drop an important impression on the Marketing and Sales managers who are concerned with the selling and promotion of selected products and are in the same product line market.

2. The results of the study may facilitate the involved managers of the companies of selected product, and will provide a path to think about the various factors which influences the consumer buying behavior.

3. The findings of the study may give an instant guidance to the managers in formulating more effective, impressive and market leading managerial policy. Knowledge of factors that influence consumers will help them in planning properly the promotional activity for the products.

4. The study will help the marketers to understand the various factors that influence consumers towards buying decisions. It will help in retaining their existing consumers.

5. The study may give a new thought to the future researcher to understand the consumer behavior and the consumers’ susceptibility to reference group influence. It will help them to expand their research in multiple directions in terms of consumer behavior. The study covers three selected cities of Chhattisgarh in particular considered and whole Chhattisgarh state in general.
3.6 DELIMITATIONS OF THE STUDY

Some practical problems came, while conducting the study; these problems might have influenced the outcome, conclusions and overview of the study. Following are the delimitations of the study:

1. Generality of the study is subject to reliability and validity of the data collection tools and methods of data collection.

2. In the study the reliability of the result depends on accurateness of data collected by the respondent.

3. The study is delimited to the behavior of consumers in terms of their influencing factor and different demographic factors. In the study the consumer is under impact of their associate reference group influence while selecting the products.

4. The influencing factor varies among different consumer. And there is a number of influencing factor that can affect the study. Fewer among them have been examined in this study; therefore the generality of the study completely depends upon the factors which are included in the study.

5. Geographical needs of the consumer in the districts differs thus the result might shows a variance in the study.

3.7 POPULATION

According to the census of India 2011 the population of Chhattisgarh is 25545198, which is comprised of 12832895 males and 12712303 females. All the residents of Chhattisgarh state constitute population for the purpose of study in general and in particular residents of all the three selected cities (Durg, Raipur and Rajnangaon) constitute target population having possession of the selected five products namely TV/LCD, DTH, Bike, Smart Phone and Refrigerator.
3.8 **SAMPLE**

The multistage sampling was be used to draw the sample from the population. At the first stage three major cites of Chhattisgarh were purposely selected by the researcher. In stage two, respondents in possession of selected products were randomly selected. A respondent having possession of all the selected products were considered as the sampled respondents otherwise, the next person was randomly selected. In total 600 respondents from three cities of Chhattisgarh were covered in the study. For the purpose of the study random sampling method was used to identify the sampled respondents.

3.9 **QUESTIONNAIRE**

The researcher developed a structured questionnaire based on the objectives of the study.

3.9.1 **Design**

The questionnaire was designed on the basis of research objectives which will helped the researcher to collect essential data associated with the consumers’ susceptibility to reference group influence on selected products. The questionnaire was prepared in easy and simple manner so that it can be easily understood by the respondent and fulfills the purpose of the study. The entire question was framed in attractive and effective manner to bring out the accurate and meaning full data from the respondents. The questionnaire consisted of structured closed ended question, which made it easy to answer on part of respondents and helped researcher in drawing specific conclusion from it.

The Questionnaire/schedule consisted of two parts. Part 1 contains 7 questions related to demography of the respondents like sex, age group, marital status, educational qualification, occupation, monthly income, and membership of professional club/association. And Part 2 contains 8 questions designed on the basis of a scale to find out the consumers’ susceptibility to reference group influence on selected products. This part of questionnaire contains multiple
choice options, followed by likert scale, which is sub divided into strongly agree, agree, neutral, disagree and strongly disagree.

3.9.2 Pre-Testing

Before administering the questionnaire among respondents, it was per tested on 50 respondents in Raipur city. And on the basis of the outcome and the feedback of the respondent in pre-testing stage, wordings of few questions were modified to make it convenient for the respondents. For this purpose support of subject expert was also taken.

3.10 COLLECTION OF DATA

Primary data and secondary data were collected for the purpose of the study. Secondary Data was collected from books, journals, articles, websites, and others published medium. And for the purpose of the study the primary data was collected with the mean of structured questionnaire/schedule prepared by the researcher. Mainly the data was collected by the researcher by personally visiting to the respondents by dropping the questionnaire to their place and then after it was collected back. For making respondent free of extreme thoughts, they were promised that the data collected from them should not be shared with others and it is just for the academic purposes. In view of the fact that sample size was large and had to cover three districts of Chhattisgarh it almost took 8 months to collect the complete data.

3.11 STATISTICAL TECHNIQUES TO ANALYZE THE DATA

Percentage method was used by the researcher to find out the reason of consultation by the respondents with their reference group for buying selected products and to analyze data pertaining to influence of reference group before buying and at the time of buying. Mean scores were used to test the hypothesis
with respect to reference group influence before buying and at the time of buying across cities and also to test hypothesis with respect to overall consumers susceptibility to reference group influence product wise. Analysis of variance (ANOVA) was conducted to test the hypothesis with respect to consumers’ susceptibility to informational, utilitarian, and value expressive reference group influence across the sampled cities. For the analysis the SPSS software was used.

3.12 DEMOGRAPHIC PROFILE OF THE SAMPLED RESPONDENTS

Table 3.1 Demographic Profile of Sampled Respondents

<table>
<thead>
<tr>
<th>Particular</th>
<th>Frequency</th>
<th>Percentage</th>
</tr>
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<tr>
<td>CITY</td>
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<tr>
<td>Durg</td>
<td>200</td>
<td>33.34</td>
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<tr>
<td>Raipur</td>
<td>300</td>
<td>50</td>
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<tr>
<td>Rajnangaon</td>
<td>100</td>
<td>16.66</td>
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<tr>
<td>Total</td>
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<td>100</td>
</tr>
<tr>
<td>SEX</td>
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<td></td>
</tr>
<tr>
<td>Male</td>
<td>442</td>
<td>73.7</td>
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<tr>
<td>Female</td>
<td>158</td>
<td>26.3</td>
</tr>
<tr>
<td>Total</td>
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<td>100</td>
</tr>
<tr>
<td>AGE</td>
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<tr>
<td>Below 20 years</td>
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<td>21-30 years</td>
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<td>31-40 years</td>
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<td>41-50 years</td>
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<td>Above 50 years</td>
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<th>MONTHLY INCOME (in Rs.)</th>
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<td>10001-50,000</td>
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